

WE CLAIM:

1. A composition comprising an adjuvant selected from the group consisting of *E. coli* heat-labile toxin (LT) and *E. coli* heat-labile toxin analogs (LT analogs) for use in vaccinating a bird.
2. The composition of **Claim 1** further comprising an immunoprotective antigen effective in a bird.
3. The composition of **Claim 2** wherein the immunoprotective antigen is derived from the group consisting of a viral, bacterial, or fungal pathogen.
4. The composition of **Claim 3** wherein the immunoprotective antigen is selected from the group consisting of known immunoprotective antigens of Newcastle disease, avian influenza, infectious bursal disease, coccidiosis, necrotic enteritis, airsacculitis, cellulitis, chicken anemia, laryngorhinotracheitis, infectious bronchitis, and Marek's disease.
5. The composition of **Claim 4** wherein the immunoprotective antigen is selected from the group consisting of Newcastle disease virus hemagglutinin neuraminidase protein and avian influenza hemagglutinin protein.
6. The composition of **Claim 1** wherein the adjuvant is produced by an *E. coli* bacterium.
7. The composition of **Claim 1** wherein the adjuvant is produced by a transgenic plant.
8. The composition of **Claim 2** wherein the immunoprotective antigen is produced in a transgenic plant.
9. The composition of **Claim 2** wherein the adjuvant and the immunoprotective antigen are produced in a transgenic plant.

10. The composition of **Claim 2** wherein the adjuvant and the immunoprotective antigen are produced in a single transgenic plant.
11. A method for vaccinating a bird comprising administering an effective amount of the composition of **Claim 1**.
12. A method for vaccinating a bird comprising administering an effective amount of the composition of **Claim 2**.
13. A method for vaccinating a bird comprising administering an effective amount of the composition of **Claim 3**.
14. A method for vaccinating a bird comprising administering an effective amount of the composition of **Claim 4**.
15. A method for vaccinating a bird comprising administering an effective amount of the composition of **Claim 5**.
16. A method for preparing a vaccine for protecting a bird against an avian disease which comprises mixing an effective amount native LT with an effective amount of an immunoprotective antigen known to elicit an immune response in a bird.
17. A method for preparing a vaccine for protecting a bird against an avian disease which comprises mixing an effective amount LT analog with an effective amount of an immunoprotective antigen known to elicit an immune response in a bird.
18. The method of **Claim 16** wherein the immunoprotective antigen is selected from the group consisting of known immunoprotective antigens of Newcastle disease, avian influenza, infectious bursal disease, coccidiosis, necrotic enteritis, airsacculitis, cellulitis, chicken anemia, laryngotracheitis, infectious bronchitis, and Marek's disease.

19. The method of **Claim 16** wherein the immunoprotective antigen is selected from the group consisting of Newcastle disease virus hemagglutinin neuraminidase protein and avian influenza hemagglutinin protein.

20. The method of **Claim 16** wherein the immunoprotective antigen is the Newcastle disease virus hemagglutinin neuraminidase protein .